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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|--|-------------|----------------------|------------------------|------------------|
| 10/743,616 | 12/22/2003 | Jeff Scott Eder | AR - 61 | 8217 |
| 53787 7590 02/06/2007 ASSET TRUST, INC. 2020 MALTBY ROAD | | | EXAMINER . | |
| | | | LIVERSEDGE, JENNIFER L | |
| SUITE 7362 BOTHELL, WA 98021 | | | ART UNIT | PAPER NUMBER |
| | | · . | 3692 | |
| SHORTENED STATUTORY PERIOD OF RESPONSE | | MAIL DATE | DELIVERY MODE | |
| 3 MONTHS | | 02/06/2007 | PAPER | |

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

| | Application No. | Applicant(s) | | | | |
|---|---|------------------|--|--|--|--|
| | 10/743,616 | EDER, JEFF SCOTT | | | | |
| Office Action Summary | Examiner | Art Unit | | | | |
| | Jennifer Liversedge | 3692 | | | | |
| The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply | | | | | | |
| A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION. - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailling date of this communication. - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication. - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b). | | | | | | |
| Status | | | | | | |
| 1)⊠ Responsive to communication(s) filed on 22 De | ecember 2003. | | | | | |
| | action is non-final. | | | | | |
| 3) Since this application is in condition for allowar | · · · · · · · · · · · · · · · · · · · | | | | | |
| closed in accordance with the practice under E | closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213. | | | | | |
| Disposition of Claims | | | | | | |
| 4)⊠ Claim(s) <u>64-96</u> is/are pending in the application | 1 | | | | | |
| 4a) Of the above claim(s) is/are withdray | | | | | | |
| 5) Claim(s) is/are allowed. | | | | | | |
| 6) Claim(s) 64-96 is/are rejected. | • | | | | | |
| 7) Claim(s) is/are objected to. | | | | | | |
| 8) Claim(s) are subject to restriction and/or | election requirement. | | | | | |
| | , | | | | | |
| Application Papers | | | | | | |
| 9) The specification is objected to by the Examine | | | | | | |
| 10)☐ The drawing(s) filed on is/are: a)☐ accepted or b)☐ objected to by the Examiner. | | | | | | |
| Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a). | | | | | | |
| Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d). | | | | | | |
| 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152. | | | | | | |
| Priority under 35 U.S.C. § 119 | | | | | | |
| 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). | | | | | | |
| a) ☐ All b) ☐ Some * c) ☐ None of: | | | | | | |
| 1. Certified copies of the priority documents have been received. | | | | | | |
| 2. Certified copies of the priority documents have been received in Application No | | | | | | |
| 3. Copies of the certified copies of the priority documents have been received in this National Stage | | | | | | |
| application from the International Bureau (PCT Rule 17.2(a)). | | | | | | |
| * See the attached detailed Office action for a list of the certified copies not received. | | | | | | |
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| | | | | | | |
| Attachment(s) | | | | | | |
| 1) Notice of References Cited (PTO-892) 4) Interview Summary (PTO-413) | | | | | | |
| 2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Notice of Draftsperson's Patent Drawing Review (PTO-948) Paper No(s)/Mail Date Notice of Informal Patent Application | | | | | | |
| I) ☐ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date See Continuation Sheet 5) ☐ Notice of Informal Patent Application 6) ☐ Other: | | | | | | |
| S. Patent and Trademark Office | | | | | | |

Continuation of Attachment(s) 3). Information Disclosure Statement(s) (PTO/SB/08), Paper No(s)/Mail Date :12/22/2003, 1/10/2005, 5/10/2005, 7/5/2005, 9/4/2005, 2/18/2006.

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DETAILED ACTION

Response to Amendment

This Office Action is responsive to Applicant's preliminary amendment of application 10/743,616 filed on April 18, 2005.

The amendment contains new claims: 64-96.

Claims 1-63 have been canceled.

Information Disclosure Statement

The references submitted in the IDS form for this application have been considered, but a cursory review was provided given the voluminous nature of references.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 64-69, 71-73, 75-80, 82-84, 86-91 and 93-95 are rejected under 35 U.S.C. 102(b) as being anticipated by "How to sort out the premium drivers of post-deal value" by Daniel W. Bielinski (further referred to as Bielinski).

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Regarding claims 64, 75 and 86, Bielinski discloses an enterprise management method, program storage device with instructions and apparatus (pages 1-5), comprising:

Preparing transaction data related to a commercial enterprise for use in processing, developing a computational model of enterprise market value by element and segment of value by completing a series of multivariate analyses that utilize at least a portion of said data (pages 1-5), and

Completing activities selected from the group consisting of: determining an element of value contribution, quantifying an element of value impact on enterprise financial performance, completing an analysis of enterprise financial performance, optimizing one or more aspects of enterprise financial performance, simulating an enterprise financial performance, optimizing a future enterprise market value, quantifying a future enterprise market value, creating a management report, valuing an enterprise market sentiment, calculating a real option discount rate, valuing a real option, valuing a share of enterprise stock, determining a target share price and combinations thereof (pages 1-5).

Regarding claims 65, 76 and 87, Bielinski discloses an enterprise management method, program storage device with instructions and apparatus where the segments of value are selected from the group consisting of current operation, market sentiment, real option and combinations thereof (pages 2-3 and 5).

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Regarding claims 66, 77 and 88, Bielinski discloses an enterprise management method, program storage device with instructions and apparatus where the elements of value are selected from the group consisting of alliances, brands, channels, customer relationships, employees, employee relationships, intellectual capital, intellectual property, partnerships, processes, production equipment, vendors, vendor relationships and combinations thereof (pages 2-4).

Regarding claims 67, 78 and 89, Bielinski discloses an enterprise management method, program storage device with instructions and apparatus where preparing data for use in processing further comprises integrating data from a plurality of enterprise related systems in accordance with a common schema (pages 1-5).

Regarding claims 68, 79 and 90, Bielinski discloses an enterprise management method, program storage device with instructions and apparatus where financial performance optimization further comprises identifying value driver changes that will optimize one or more aspects of financial performance where said aspects of financial performance are selected from the group consisting of revenue, expense, capital change, cash flow, current operation value, real option value, derivative value, future market value, market sentiment value, market value and combinations thereof (pages 1-5).

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Regarding claims 69, 80 and 91, Bielinski discloses an enterprise management method, program storage device with instructions and apparatus wherein a series of multivariate analyses are selected from the group consisting of identifying one ore more previously unknown item performance indicators, discovering one or more previously unknown value drivers, identifying one or more previously unknown relationships between one ore more value drivers, identifying one or more previously unknown relationships between one or more elements of value, quantifying one or more interrelationships between value drivers, quantifying one or more impacts between elements of value, developing one or more composite variables, developing one or more vectors, developing one or more causal element impact summaries, identifying a best fit combination of predictive model algorithm and element impact summaries for modeling enterprise market value and each of the components of value, determining a net element of value impact for each segment of value, determining a relative strength of a plurality of elements of value between two or more enterprises, developing one or more real option discount rates, calculating one or more real option values, calculating an enterprise market sentiment value by element of value, and combinations thereof (pages 1-5).

Regarding claims 71, 82 and 93, Bielinski discloses an enterprise management method, program storage device with instructions and apparatus wherein enterprise related transaction data are obtained from systems selected from the group consisting of advanced financial systems, basic financial systems, alliance management systems,

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brand management systems, customer relationship management systems, channel management systems, estimating systems, intellectual property management systems, process management systems, supply chain management systems, vendor management systems, operation management systems, sales management systems, human resource systems, accounts receivable systems, accounts payable systems, capital asset systems, inventory systems, invoicing systems, payroll systems, purchasing systems, web site systems, the Internet, external databases and combinations thereof (pages 1-5).

Regarding claims 72, 83 and 94, Bielinski discloses an enterprise management method, program storage device with instructions and apparatus wherein an enterprise further comprises a single product, a group of products, a division or an entire company (pages 1-5).

Regarding claim 73, 84 and 95, Bielinski discloses an enterprise management method, program storage device with instructions and apparatus wherein the model of enterprise market value further comprises a combination of models selected from the group consisting of a predictive component of value model, a real option discount rate model, a real option valuation model, a derivative valuation model, an excess financial asset valuation model, a market sentiment model by element of value and combinations thereof (pages 1-5).

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Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

The factual inquiries set forth in *Graham* v. *John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

- 1. Determining the scope and contents of the prior art.
- 2. Ascertaining the differences between the prior art and the claims at issue.
- 3. Resolving the level of ordinary skill in the pertinent art.
- Considering objective evidence present in the application indicating obviousness or nonobviousness.

Claims 70, 81, 92, 74, 85 and 96 are rejected under 35 U.S.C. 103(a) as being unpatentable over Bielinski, and further in view of "Machine-learning research: Four current directions" by Thomas G. Deitterich (further referred to as Deitterich).

Regarding claims 70, 81 and 92, Bielinski does not disclose an enterprise management method, program storage device with instructions and apparatus wherein a predictive model algorithm is selected from the group consisting of neural network; classification and regression tree; generalized autoregressive conditional heteroskedasticity; regression; generalized additive; redundant regression network;

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rough-set analysis; Bayesian; multivariate adaptive regression spline and support vector method.

However, Deitterich discloses an enterprise management method, program storage device with instructions and apparatus wherein a predictive model algorithm is selected from the group consisting of neural network; classification and regression tree; generalized autoregressive conditional heteroskedasticity; regression; generalized additive; redundant regression network; rough-set analysis; Bayesian; multivariate adaptive regression spline and support vector method (pages 1-39).

It would be obvious to one of ordinary skill in the art to modify the computerized models for determining valuation by using multiple value drivers as disclosed by Kielinski to adapt the use of the model algorithms as disclosed by Deitterich. The motivation would be to use an algorithm from among the many known algorithms for performing computations.

Regarding claims 74, 85 and 96, Bielinski discloses an enterprise management method, program storage device with instructions and apparatus where genetic algorithms are used to identify changes that will optimize one or more aspects of enterprise financial performance and multi-criteria optimization models are used to identity the changes that will optimize two or more aspects of enterprise financial performance (pages 1-5).

Bielinski does not disclose an enterprise management method, program storage device with instructions and apparatus where a Markov Chain Monte Carlo model is

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used to identify one or more changes that will optimize one aspect of enterprise financial performance. However, Dietterich discloses the use of a Markov Chain Monte Carlo model for optimization (pages 5-6). It would be obvious to one of ordinary skill in the art to modify the computerized models for determining valuation by using multiple value drivers as disclosed by Kielinski to adapt the use of the Markov Chain Monte Carlo model as disclosed by Deitterich. The motivation would be to use a model which is used with neural networks for performing combinatorial optimization computations.

Conclusion

Any inquiry concerning this communication should be directed to Jennifer Liversedge whose telephone number is 571-272-3167. The examiner can normally be reached on Monday – Friday, 8:30 – 5 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Richard Chilcot can be reached at 571-272-6777. The fax number for the organization where the application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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Jennifer Liversedge

Examiner

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RICHARD & CHILCOT, JR.